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10/790,196	03/02/2004	Akiko Niimi	118891	1018
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OLIFF & BERRIDGE, PLC P.O. BOX 19928 ALEXANDRIA, VA 22320			NGUYEN, LAM S	
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			2853	

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Please find below and/or attached an Office communication concerning this application or proceeding.



## **DETAILED ACTION**

### ***Priority***

Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

### ***Drawings***

The drawings are objected to because FIGs. 2, 5, 6, 7, and 8 contain a typo error: "MOVEMENT DEIRECTION OF" should be corrected as "MOVEMENT DIRECTION OF". Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

### ***Specification***

The abstract of the disclosure is objected to because it contains more than 150 words.

Correction is required. See MPEP § 608.01(b).

- (k) Abstract of the Disclosure: See MPEP § 608.01(f). A brief narrative of the disclosure as a whole in a single paragraph of 150 words or less commencing on a separate sheet following the claims. In an international application which has entered the national stage (37 CFR 1.491(b)), the applicant need not submit an abstract commencing on a separate sheet if an abstract was published with the international application under PCT Article 21. The abstract that appears on the cover page of the pamphlet published by the International Bureau (IB) of the World Intellectual Property Organization (WIPO) is the abstract that will be used by the USPTO. See MPEP § 1893.03(e).

### ***Claim Objections***

Claims 1-2 are objected to because of the following informalities: The claims recite the limitations “the length” on line 9, “the power supply” on line 10 without sufficient antecedent basis for these limitations in the claims. Appropriate correction is required.

Claim 3 is objected to because of the following informalities: The claim recites the limitation “the edge” on line 3 without sufficient antecedent basis for the limitation in the claim. Appropriate correction is required.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

1. Claims 1-2, 3, and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cummins et al. (US 6760052) in view of Tanaka et al. (JP 411066703A).

**Regarding to claims 1-2:**

Cummins et al. discloses a printing device comprising:

a medium conveyance section movable reciprocatingly in a linear direction (*FIGs. 1-3, element 22: The disc support tray moves inwardly or outwardly along a direction perpendicular to the frame 12*), on which a workpiece (*FIG. 1, element 25A*) can be set in position;

a fixed side structure (*FIG. 9, element 12*) which supports said medium conveyance section and has a space formed therein for accommodating said medium conveyance section (*FIG. 9, element 20*); and

a head (*FIG. 1-3, element 16*), provided on said fixed side structure (*FIG. 1-3, element 12*), for forming images on said workpiece (*FIG. 1, element 25A and column 3, lines 35-37: The tray is movable under a positive, coordinated drive relative to the printhead 16 for printing on a disc on the tray*);

said medium conveyance section is positioned so as to project partially to one side from the length of said fixed side structure in the direction of movement of said medium conveyance section, when workpiece is set in position on, or removed from, said medium conveyance section (*FIG. 1-3: The tray 22 is in a position of loading or unloading the disc 25A. This position is partially projected respect to the structure 12*); and

during a printing operation onto the workpiece, said medium conveyance section is controlled so as to move from a position where it projects partially to one side from the length of the fixed side structure in the direction of movement of said medium conveyance section, to a position where it projects partially to the other side or towards the other side until the center of gravity thereof passes the center of gravity of said fixed side structure, and then return again to

the position where it projects partially to said one side (*FIG. 1-3: Initially, the tray 22 is in a position that is partially projected respect to the structure 12 as shown in FIG. 2. Then the tray 22 moves inwardly to scan the whole disc 25A underneath the printhead 16 for printing purpose. At this position, the tray also is partially projected respect to the structure 12 and the center of tray 22 also passes the center of the structure 12. After printing, the tray moves outwardly back to the initial position*).

Cummins et al., however, is silent wherein said medium conveyance section is positioned so as to be contained within the length of said fixed side structure in the direction of movement of said medium conveyance section, when the power supply to the device is in an off state.

Tanaka et al. discloses a device comprising a medium conveyance section (*Abstract and FIG. 5: The disc tray 41*) movable reciprocatingly in a linear direction (*FIG. 5, element 41*), on which a workpiece (*FIG. 5, element 10*) can be set in position and a structure (*FIG. 5, element 4*) which supports said medium conveyance section and has a space formed therein for accommodating said medium conveyance section (*FIG. 4-5*), wherein the medium conveyance section (disk tray) is located within the structure when power supply to the device is in an off state (*Abstract: The device controller (CPU) checks whether the disk tray is in an open or close state. If the disk tray is in an open state, the CPU performs the power-off after performing a tray closing processing. In other words, the disk tray (conveyance section) is located within the structure when the power supply is in an off state*).

Therefore, it would have been obvious for one having ordinary skill in the art at the time invention was made to modify Cummins et al.'s disc printing apparatus to position the disc tray inside the structure when the power supply is in an off state as disclosed by Tanaka et al.

The motivation for doing so would have been to avoid any damage or being scratched to the disc or the tray during a non-use state of the apparatus as taught by Tanaka et al. (*Abstract*).

- **Cummins et al. also teaches the following claimed invention:**

**Regarding to claims 3, 6:** wherein said fixed side structure has a cutaway section for causing said medium conveyance section to be exposed, in the edge on the side to which said medium conveyance section projects when said workpiece is set in position on, or removed from, said medium conveyance section (*FIG. 1: The cut away section is the middle space of the housing 12 where the disc tray 12 is exposed*).

2. Claims 4-5 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cummins et al. (US 6760052) in view of Tanaka et al. (JP 411066703A), as applied to claim 1, and further in view of Drynkin et al. (US 6580444).

Cummins et al., as modified, discloses the claimed invention as discussed above except a cover for covering said medium conveyance section when it is in a partially projecting state from said fixed side structure, said cover being provided detachably with respect to the fixed side structure.

Drynkin et al. discloses a printing apparatus comprising a printhead unit (*FIG. 2, element 26*), accommodated in a fixed side structure (*FIG. 2, element 16*), for forming images on a printing medium (*FIG. 2, element 20*) conveyed by a linear reciprocating movable conveyance section (*FIG. 1-2, element 22*), and a cover (*FIG. 1, element 24*) for covering the conveyance section when it is in a partially projecting state from said fixed side structure (*FIG. 1: The conveyance section 22 is in a position partially projecting to a structure covered by element 24*),

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said cover being provided detachably with respect to the fixed side structure (*column 5, lines 24-26: The cover 24 is easily removable from the housing 16*).

Therefore, it would have been obvious for one having ordinary skill in the art at the time invention was made to modify Cummins et al.'s printing apparatus (as modified) to include a cover for covering the printhead unit and the conveyance section as disclosed by Drynkin et al.

The motivation for doing so would have been well known in the art for providing protection to the printhead unit and the conveyance section.


### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to LAM S. NGUYEN whose telephone number is (571)272-2151.

The examiner can normally be reached on 7:00AM - 3:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, STEPHEN D. MEIER can be reached on (571)272-2149. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

  
LAM NGUYEN